CLAIMS

What is claimed is:

- 1. A STANAG 5066 communication system, comprising:
- a first unit; and

a second unit, wherein the first unit provides an LQA command to the second unit, wherein the second unit records a first LQA value in response to the LQA command and transmits the first LQA value to the first unit, wherein the first unit records a second LQA value in response to the first LQA value and transmits the second LQA value to the second unit, wherein the first unit and the second unit communicate data at a data rate selected in response to the first LQA value and the second LQA value.

- 2. The STANAG 5066 communication system of claim 1 wherein the first unit and the second unit communicate data at an interleaving level selected in response to the first LQA value and the second LQA value.
- 3. The STANAG 5066 communications system of claim 2 wherein the first communication unit and the second communication unit are wireless units.
- 4. The STANAG 5066 communication system of claim 3 wherein the first communication unit and the second communication unit otherwise communicate according to STANAG 5066.
- 5. The STANAG 5066 communication system of claim 1 wherein the LQA value indicates a quality of a channel between the first unit and the second unit.
- 6. The STANAG 5066 communication system of claim 5 wherein the LQA command includes a preamble, and a first character, the first character being comprised of seven bits.

7. A wireless communication unit operating according to a STANAG 5066 specification, the communication unit comprising:

a receiver;

a transmitter; and

an initialization circuit, wherein the initialization circuit determines a data rate for at least one of the receiver and the transmitter, the initialization circuit selecting the data rate in response to a first LQA value received by the receiver.

- 8. The communication of claim 7 wherein the initialization circuit determines an interleaving level.
- 9. The communication unit of claim 7 wherein the data rate is set according to an algorithm.
- 10. The communication unit of claim 9 wherein the algorithm includes a maximum data rate, a default rate and a minimum data rate and uses the first LQA value to choose the data rate between the maximum data rate and the minimum data rate.
- 11. The communication unit of claim 7 wherein the transmitter provides a command LQA value.
- 12. The communication unit of claim 7 wherein the data rate is greater than 300 bits per second.

13. A method of setting a data rate for a STANAG 5066 communication link, the method comprising:

receiving a quality command signal;
recording a quality command value in response to the quality command signal;
transmitting a quality command value signal related to the quality command value;
receiving an acknowledgment of the quality command value signal; and
setting the data rate in response to the acknowledgement and the quality command
value.

- 14. The method of claim 13 wherein the quality command value signal and the acknowledgement include SINAD bits and BER bits.
- 15. The method of claim 13 wherein the quality command value signal and the acknowledgement include MP bits, SINAD bits and BER bits.
 - 16. The method of claim 13 wherein the quality command signal is a wireless signal.